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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/585,932	07/13/2006	Bernfried Kalthof	292754US0PCT	9274

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EXAMINER	
HAUTH, GALEN H	

ART UNIT	PAPER NUMBER
1791	

NOTIFICATION DATE	DELIVERY MODE
02/08/2010	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary	Application No.	Applicant(s)	
	10/585,932	KALTHOF ET AL.	
	Examiner	Art Unit	
	GALEN HAUTH	1791	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *18 November 2009*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-7* is/are pending in the application.

4a) Of the above claim(s) *4-7* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-3* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

1. Acknowledgment is made to applicant's amendment of claims 1-3. No new matter has been added.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. The factual inquiries set forth in *Graham* **v.** *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

4. Claims 1-3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Back (PN 4943463) in view of Harper (NPL – Handbook of Plastics, Elastomers, and Composites) and Kessler (PN 4288905).

a. With regards to claim 1, Back teaches an extrusion method for thermoplastics (abstract) in which a hollow preform is extruded from the thermoplastic, and once the preform is downstream in the calibration jacket, a second stream of the same material is injected inside the perform (col 2 ln 1-16).

While Back teaches that the two streams are from independent extruders, the claim limitation of a molding composition divided in its broadest reasonable interpretation reads on using identical thermoplastics in two extruder screws as it would have been obvious to one of ordinary skill in the art at the time the invention was made to use the same source of raw material for both extruders as both use the same material. While Back does not teach a specific length of the calibration jacket, it would have been obvious to one of ordinary skill in the art at the time the invention was made to adjust the length of the calibration jacket including to about 20 cm to optimize the process of Back. Back does not teach that the plastic is transparent. Back does not teach that the calibrator is a vacuum tank calibrator.

b. Harper teaches that polymethylmethacrylate (PMMA) is commonly used thermoplastic in extrusion processes to form rods, and that typical applications optimize the clarity of PMMA (pg 49 1.5.19). It would have been obvious to one of ordinary skill in the art at the time the invention was made to use PMMA as a material in the process of Back, because PMMA is a common thermoplastic extruded in rod form similar to the process of Back presenting a reasonable expectation of success resulting in a transparent plastic.

c. Kessler teaches that it was known in the art at the time the invention was made to use a vacuum cooling calibration apparatus following the exit of a material from an extruder (col 1 ln 20-68). It would have been obvious to one of ordinary skill in the art at the time the invention was made to use a vacuum

calibration tank in the process of Back because such was a well known apparatus in the art for extrusion post processing and results in the benefit of the plastic body maintaining engagement with the wall of the sizing device (col 1 ln 33-45).

d. With regards to claim 2, Harper teaches that PMMA is up to 92% transparent to light (1.5.19).

e. With regards to claim 3, Harper teaches that colorants can be added to PMMA (1.5.19), thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to include a dye in the plastic of Back as such was a well known method for PMMA processing in the art at the time the invention was made presenting a reasonable expectation of success.

Response to Arguments

5. Applicant's arguments filed 11/18/2009 have been fully considered but they are not persuasive.

a. With regards to applicant's arguments that the claimed distance of 20 cm is not a result effective variable, because the prior art does not explicitly teach it as such is not persuasive. The distance represents a calibration distance and is equivalent to residence time or a holding period which are known result effective variables.

b. With regards to applicant's arguments that the conclusion of about 20 cm consists of impermissible hindsight, this argument is not persuasive. Back in view of Kessler is silent as to any specific distance, thus prompting one of

ordinary skill in the art at the time the invention was made to attempt a number of distances including 20 cm through routine optimization. It must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See In re McLaughlin, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

c. With regards to applicant's argument's that a case of obviousness with regards to 20 cm is rebutted by a showing of unexpected results, this argument is not persuasive. A mere statement of unexpected results is not sufficient to overcome a prima facie case of obviousness, but rather requires objective factual evidence.

Conclusion

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to GALEN HAUTH whose telephone number is (571)270-5516. The examiner can normally be reached on Monday to Thursday 8:30am-5:00pm ET.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christina Johnson can be reached on (571)272-1176. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/GHH/

/Christina Johnson/
Supervisory Patent Examiner, Art Unit 1791